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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|----------------------|-------------------------------|------------------|
| 10/677,933 | 10/01/2003 | Richard H. Boivie | YOR920030398US1 (8728-647) | 9603 |
| 46069 | 7590 | 12/04/2006 | EXAMINER ALMEIDA, DEVIN E | |
| F. CHAU & ASSOCIATES, LLC 130 WOODBURY ROAD WOODBURY, NY 11797 | | | ART UNIT 2132 | PAPER NUMBER |

DATE MAILED: 12/04/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/677,933

Applicant(s)

BOIVIE ET AL.

Examiner

Devin Almeida

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2132

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10/1/2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 01 October 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.


KAMBIZ ZAND
PRIMARY EXAMINER

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

This action is in response to the papers filed 10/01/2003. Claims 1-22 were received for consideration. No preliminary amendments for the claims were filed. Currently claims 1-22 are under consideration.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1-6, 9-16, 18, and 19-22 are rejected under 35 U.S.C. 102(b) as being anticipated by Ober et al. (U.S. Patent # 6,397,331). Ober teaches with respect to claims 1 and 11, a computing device for securely executing authorized code, said computing device comprising: a protected memory (see column 2 line 4 – column 2 line 19 i.e protected memory, secure memory or secure kernel memory) for storing authorized code (see column 2 line 4 – column 2 line 19 i.e control code), which contains an original digital signature (see column 1 line 53 – column 4 line 5); and a processor in signal communication with said protected memory for preparing to execute code from the protected memory by verifying that a digital signature contained in said code is original in accordance with a public key, and if said original digital signature is verified, then branching to a copy of said authorized code in said protected memory to begin execution (see column 1 line 53 – column 4 line 5)..

With respect to claims 2 and 12, protected memory is cryptographically protected (see column 1 line 53 – column 4 line 5).

With respect to claims 3 and 13, the integrity of the contents of said protected memory is protected by encryption (see column 1 line 53 – column 4 line 5).

With respect to claims 4 and 14, protected memory is physically protected (see column 1 line 53 – column 4 line 5).

With respect to claims 5 and 15, public key is stored in said protected memory.

With respect to claims 6 and 16, at least one of the integrity of said authorized code and the privacy of said authorized code is protected at run time (see column 1 line 53 – column 4 line 5).

With respect to claims 9 and 20, the protected memory stores code with an original digital signature corresponding to an Owner Public Key (see column 1 line 53 – column 4 line 5); and the processor verifies the Owner Public Key in accordance with a Manufacturer Public Key, which is resident on the processor, and then verifies the original digital signature in accordance with the Owner Public Key (see column 1 line 53 – column 4 line 5).

With respect to claims 10 and 21, reading means for reading a Certificate containing an Owner Public Key (see column 1 line 53 – column 4 line 5); validation means for validating the Certificate with the Manufacturer Public Key (see column 1 line 53 – column 4 line 5); matching means for finding the Owner Public Key in the Certificate that matches the Owner Number in the processor (see column 1 line 53 –

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column 4 line 5); and verification means for using the matched Owner Public Key to verify the authorized code (see column 1 line 53 – column 4 line 5).

With respect to claim 18, the privacy of said authorized code is protected at run time (see column 1 line 53 – column 4 line 5).

With respect to claim 22, a program storage device readable by machine, tangibly embodying a program of instructions executable by the machine to perform program steps for ensuring that a processor will execute only authorized code, the program steps comprising: applying an original digital signature to all authorized code (see column 1 line 53 – column 4 line 5); storing said signed authorized code in a protected memory (see column 1 line 53 – column 4 line 5); preparing to execute code from the protected memory by verifying a digital signature used to sign said code in accordance with a public key, which corresponds to said original digital signature (see column 1 line 53 – column 4 line 5); and branching to a copy of said authorized code in said protected memory to begin execution if said original digital signature is verified (see column 1 line 53 – column 4 line 5).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

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Claim 7, 8, 17, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ober et al. (U.S. Patent # 6,397,331) in view of Ford et al (U.S. Patent # 5,481,613).

Ober teaches everything with respect to claim 6, 16 and 18 above but with respect to claims 7 and 17, Ober teaches that the integrity of authorized code is protected with asymmetric key encryption and does not teach the use of symmetric key encryption.

Ford teaches symmetric key encryption (see column 2 line 45-50). It would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains to have replaced the asymmetric key of Ober with a symmetric keys for lower processing overheads and its ability to encryption/decryption of large volumes of data (see Ford column 2 lines 45-50).

With respect to claims 8 and 19, Ober teaches the privacy of said authorized code is protected at run time with an asymmetric key encryption and does not teach the use of symmetric key encryption. Ford teaches symmetric key encryption (see column 2 line 45-50). It would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains to have replaced the asymmetric key of Ober with a symmetric keys for lower processing overheads and its ability to encryption/decryption of large volumes of data (see Ford column 2 lines 45-50).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Devin Almeida whose telephone number is 571-270-


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1018. The examiner can normally be reached on Monday-Thursday from 7:30 A.M. to 5:00 P.M. The examiner can also be reached on alternate Fridays from 7:30 A.M. to 4:00 P.M.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gilberto Barron, can be reached on 571-272-3799. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

DA
Devin Almeida
Patent Examiner
11/29/2006


KAMBIZ ZAND
PRIMARY EXAMINER